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**SUPPLEMENTARY  
EUROPEAN SEARCH REPORT**

Application Number  
EP 94 92 1537

DOCUMENTS CONSIDERED TO BE RELEVANT			
Category	Citation of document with indication, where appropriate, of relevant passages	Relevant to claim	CLASSIFICATION OF THE APPLICATION (Int.Cl.6)
X	US-A-4 405 337 (YANMAR DIESEL ENGINE CO)  * claims 1,2,4 * * column 2, line 52 - line 54 * * column 2, line 62 - line 64 * * examples 1-6 *  -----	1,2,4,7,13,15-18,20	C10L1/02 C10L1/10 C10L1/18
			<b>TECHNICAL FIELDS SEARCHED (Int.Cl.6)</b>  C10L
The supplementary search report has been drawn up for the claims attached hereto.			
Place of search <b>THE HAGUE</b>		Date of completion of the search <b>6 June 1996</b>	Examiner <b>De Herdt, O</b>
<b>CATEGORY OF CITED DOCUMENTS</b> X : particularly relevant if taken alone Y : particularly relevant if combined with another document of the same category A : technological background O : non-written disclosure P : intermediate document  T : theory or principle underlying the invention E : earlier patent document, but published on, or after the filing date D : document cited in the application L : document cited for other reasons & : member of the same patent family, corresponding document			

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The claims defining the invention are as follows:

1. A fuel blend composition including a hydrocarbon liquid as hereinbefore defined, up to 20% of the total composition of ethanol and/or n-propanol and up to 15% by volume of the total composition of a fatty acid and/or organic ester.
- 5 2. A fuel blend composition according to claim 1 wherein the fatty acid and/or organic ester component is between 1.5% - 11% by volume of the total composition.
3. A fuel blend composition according to claim 1 wherein the fatty acid and/or organic ester component is between 2% - 5% by volume of the total composition.
4. A fuel blend composition according to any of claims 1 to 3 wherein the fatty acid is  
10 derived from natural oils and fats or vegetable oils or is produced by synthetic means or any mixtures thereof.
5. A fuel blend composition according to claim 4 wherein the natural oils and fats are lard and tallow.
6. A fuel blend composition according to claim 4 wherein the vegetable oils are  
15 derived from canola, palm, corn, sunflower oil or soya bean oils.
7. A fuel blend composition according to any of the claims 1 to 3 wherein the organic ester is selected from fatty acids, aromatic esters and/or aliphatic esters and any mixtures thereof.
8. A fuel blend composition according to claim 7, additionally including a  
20 dicarboxylic acid ester.
9. A fuel blend composition according to claim 7 wherein the fatty acids are selected from ethyl oleate, methyl oleate, ethyl tallowate, iso-propyl oleate, butyl oleate, methyl oleate or methyl cocoate.
10. A fuel blend composition according to claim 7 wherein the aromatic esters are  
25 selected from butyl benzoate and ethyl acetate.
11. A fuel blend composition according to claim 7 wherein the dicarboxylic acid ester is dioctyl maleate.
12. A fuel blend composition according to any of the previous claims further including methanol, iso-propanol, butanol, iso-butanol, tertiary butanol and mixtures thereof.
- 30 13. A fuel blend composition according to any of the previous claims wherein the hydrocarbon liquid is at least 40% by volume of the total composition.
14. A fuel blend composition according to any of the previous claims wherein the hydrocarbon liquid is between 75% - 85% by volume of the total composition.

15. A process for producing a single phase fuel blend composition according to any one of claims 1 to 14 including the steps of:
- a) adding the ethanol and/or n-propanol alcohol to the hydrocarbon liquid to form an alcohol phase and an oil phase; thereafter
  - 5 (b) adding the mixture of step (a) to the fatty acid and/or organic ester ; and
  - (c) mixing the resultant mixture until a single phase is formed.
16. A process for producing a single phase fuel blend according to any one of claims 1 to 14 including the steps of:
- 10 (a) adding the ethanol and/or n-propanol to the fatty acid and/or organic ester; thereafter
  - (b) adding the mixture of step(a) to the hydrocarbon liquid ; and
  - (c) mixing the resultant mixture until a single phase is formed;
17. A fuel blend composition as hereinbefore described by reference to any of the examples.
- 15 18. A fuel additive composition including ethanol and/or n-propanol and a fatty acid and/or organic ester in respective amounts ranging from a ratio of 25:1 to 1:1.
19. A fuel blend composition including the hydrocarbon liquid and up to 35% of the fuel additive composition as in claim 18.
20. A fuel additive composition as hereinbefore described by reference to any of the examples.
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